

d. using a computer controller to control the electric motor so that the electric motor can rotate the driveshaft alone or with the internal combustion engine, depending on vehicle traction drive demands.

20. The method of claim 19, wherein the fuel cell system uses a Solid Oxide Fuel Cell (SOFC).

21. The method of claim 20, wherein the exhaust from internal combustion engine provides heat to the SOFC.

22. The method of claim 19, including feeding an exhaust from the fuel cell system to an intake of the internal combustion engine.

Abstract Of The Disclosure

A hybrid fuel cell motor vehicle includes a fuel cell system for powering an electric motor that has its rotor or armature constructed as part of the driveshaft such that the driveshaft can be turned via the electric motor or by the force of an internal combustion engine for the purpose of driving at least one wheel of the vehicle without the need for an interconnecting gearbox or a traction battery.

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